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| 10/506,751      | 09/03/2004  | Katsuya Yamamoto     | 09792909-6475       | 6582             |

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| EXAMINER |
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BALAOING, ARIEL A

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2617

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08/06/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

|                              |                                      |                                          |  |
|------------------------------|--------------------------------------|------------------------------------------|--|
| <b>Office Action Summary</b> | <b>Application No.</b><br>10/506,751 | <b>Applicant(s)</b><br>YAMAMOTO, KATSUYA |  |
|                              | <b>Examiner</b><br>Ariel Balaoing    | <b>Art Unit</b><br>2617                  |  |

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 02 July 2007.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,3-7 and 9-14 is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 13 and 14 is/are allowed.
- 6) ☒ Claim(s) 1,3-7 and 9-12 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 03 September 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☒ All    b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |                                                                                                            |                                                                                         |
|------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                                           | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____                                                |

## DETAILED ACTION

### *Response to Arguments*

1. Applicant's arguments, see page 8-10 of the remarks, filed 07/02/2007, with respect to Claims 13 and 14 have been fully considered and are persuasive. The 35 U.S.C. 112, first paragraph rejection of Claims 13 and 14 have been withdrawn.
2. Applicant's arguments filed 07/02/2007 with regards to the 35 U.S.C. rejections of Claims 1-12 have been fully considered but they are not persuasive.
3. In response to applicant's argument that *"although Imatsuka disclose that the control circuit 20 subsequently interrupts the call to the partner, it is not to prevent interference from any communication between the telephone M and the reader/writer as evident from Imatsuka teaching that ID number, station code, and time code be transmitted between the telephone M and the reader/writer 42 while a call from the telephone M to the partner is taking place. Instead, Imatsuka discloses that the control circuit 20 subsequently interrupts the call to the partner for the purpose of preventing accounting charges from applying to the call while the caller is attempting to transfer the automatic ticket gate 2"* (see page 13 and 14 of the remarks), a recitation of the intended use of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim. Furthermore, temporarily interrupting a second radio would inherently inhibit interference to a second radio signal since interference between competing signal producing devices in close proximity is known in the art, and

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thus a temporary interrupt of either source would inhibit interference. Furthermore, Imatsuka does not suggest that the teachings in the disclosure could not be used strictly for the purposes of interference inhibition, and therefore, does not teach away from the claimed limitations.

4. In response to applicant's arguments against the references individually (see page 14-15), one cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986).

5. In response to applicant's argument that "*the Imatsuka portable telephone M would not be improved by modifying the Imatsuka portable telephone M to include the teachings of Nevo*" (see page 15 of the remarks), the test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981). Furthermore, Nevo states that providing an immediate inhibition of one of a plurality radio device would result in less data corruption and loss data the radio devices (see paragraph 7).

***Allowable Subject Matter***

6. Claims 13 and 14 are allowed.

7. The following is an examiner's statement of reasons for allowance: Claims 13 and 14 are allowed for the reasons set forth in the Office Action filed 04/06/2007.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

***Claim Rejections - 35 USC § 103***

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Claims 1, 3, 5, 7, 9, and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over IMATSUKA (JP 2002095051) in view of SEPPANEN (US 6,330,442) and NEVO et al (US 2003/0214961 A1).

Regarding claims 1, IMATSUKA discloses a radio communication method in a phone having a first part operatively configured to effect a first bidirectional radio communication [cellular phone function] with a predetermined station and a second part operatively configured to effect a second bidirectional radio communication [short range radio communication function] with a reader/writer when the phone is positioned adjacent to the reader writer, (42-Figure 5) (abstract; paragraph 13), the method comprising: detecting, via the second part of the phone, as signal transmitted by the reader/writer to start the second radio communication with the reader/writer (paragraph 7-10; a short-distance radio communication function is initiated when the portable telephone is positioned in proximity of the ticket gate); and in response to detecting the

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signal transmitted by the reader/writer to start the second radio communication with said reader/writer (paragraph 2, 7-10; Bluetooth communication is initiated), temporarily stopping output of transmission data in the first radio communication with said predetermined station (paragraph 7-10; paragraphs 39-53; the call in progress is temporarily interrupted in order to perform gate processing. As pointed out by the applicant, the station and time codes are sent to the partner of the call before the interruption occurs), such that the temporary stop is such that the second radio communication is inhibited from causing interference in the first radio communication (paragraph 7-10; it has been well established in the art that inhibiting a wireless communication connection between one of two devices in close proximity to each other will inhibit interference to the active connection); wherein the step of temporarily stopping output of transmission data comprises stopping via a controller associated with the second part of the phone, the inputting of transmission data (paragraphs 6, 11-39, 62, and 63; phone call is interrupted when short range transmission is detected). However IMATSUKA does not disclose wherein the data is stored in a buffer.

SEPPANEN discloses wherein transmission data is stored in a buffer (column 14:lines 37-48). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify IMATSUKA to include a storage buffer for transmission data as taught by SEPPANEN as both systems disclose signal transmissions from a portable device. This is beneficial in that it allows the mobile device to control the transmission rate of outgoing data. Furthermore it is well known in the art to buffer wireless communications before sending transmissions. However, the

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combination of IMATSUKA and SEPPANEN does not expressly disclose wherein in response to detecting a signal to start a second radio communication, temporarily stopping output of transmission data in a first radio communication such that the second radio communication is immediately inhibited from causing interference in the first radio communication (IMATSUKA teaches that a message is first sent to caller/called party before temporarily stopping communication with said caller/called party). NEVO discloses wherein in response to detecting a signal to start a second radio communication, temporarily stopping output of transmission data in a first radio communication such that the second radio communication is immediately inhibited from causing interference in the first radio communication (abstract; Figure 9B; paragraph 9-11). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify the combination of IMATSUKA and SEPPANEN to include the teachings of NEVO, since NEVO states that such a modification would result in less data corruption and loss data (paragraph 7).

Regarding claim 3, see the rejections of the parent claim concerning the subject matter this claim is dependent upon. IMATSUKA further discloses transmitting packets having control data associated with said first bidirectional radio communication even when no data is stored in said buffer (paragraphs 6, 11-39, 62, and 63; call is placed on hold, hence no data is stored and a control channel is left open between the portable device and the called party).

Regarding claim 5, see the rejections of the parent claim concerning the subject matter this claim is dependant upon. IMATSUKA further discloses further comprising:

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detecting, via the second part of the phone, the completion of said second radio communication (paragraphs 7-14, 60-69); and when completion of said second radio communication is detected, permitting the outputting of the transmission data is released (paragraphs 60-69).

Regarding claim 7, IMATSUKA discloses a radio communication unit comprising: a first radio communication processor operatively configured to generate a first bidirectional radio communication [cellular phone function] with a predetermined station (paragraphs 11-39, 39-53), a second radio communication processor operatively configured to generate a second bidirectional radio communication [short range radio communication function; SF card] with an adjacent reader/writer (42-Figure 5) (abstract; paragraph 2, 11-39), and a controller operatively configured to detect a signal transmitted by the reader/writer for starting the second radio communication with the reader/writer and to temporarily stop output of transmission data in said first radio communication processor (paragraphs 11-39, 39-53), such that the second radio communication is inhibited from causing interference in the first radio communication (paragraph 7-10; it has been well established in the art that inhibiting a wireless communication connection between one of two devices in close proximity to each other will inhibit interference to the active connection); wherein the controller stops the output of transmission data by temporarily inhibiting the input of the transmission data (paragraphs 6, 11-39, 62, and 63; phone call is interrupted when short range transmission is detected). However IMATSUKA does not expressly disclose wherein a buffer is used to temporarily store the transmission data for output. SEPPANEN



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discloses wherein a buffer is used to temporarily store the transmission data for output. (column 14:lines 37-48). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify IMATSUKA to include a storage buffer for transmission data as taught by SEPPANEN as both systems disclose signal transmissions from a portable device. This is beneficial in that it allows the mobile device to control the transmission rate of outgoing data. Furthermore it is well known in the art to buffer wireless communications before sending transmissions. However, the combination of IMATSUKA and SEPPANEN does not expressly disclose wherein in response to detecting a signal to start a second radio communication, temporarily stopping output of transmission data in a first radio communication such that the second radio communication is immediately inhibited from causing interference in the first radio communication (IMATSUKA teaches that a message is first sent to caller/called party before temporarily stopping communication with said caller/called party). NEVO discloses wherein in response to detecting a signal to start a second radio communication, temporarily stopping output of transmission data in a first radio communication such that the second radio communication is immediately inhibited from causing interference in the first radio communication (abstract; Figure 9B; paragraph 9-11). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify the combination of IMATSUKA and SEPPANEN to include the teachings of NEVO, since NEVO states that such a modification would result in less data corruption and loss data (paragraph 7).

Regarding claim 9, see the rejections of the parent claim concerning the subject matter this claim is dependant upon. IMATSUKA further discloses wherein the controller stops the output of transmission data while permitting the transmission of packets having control data associated with said first bidirectional radio communication, even when no data is stored (paragraphs 6, 11-39, 62, and 63; call is placed on hold, hence no data is stored and a control channel is left open between the portable device and the called party).

Regarding claim 11, see the rejections of the parent claim concerning the subject matter this claim is dependant upon. IMATSUKA further discloses wherein said controller is operatively configured to detect the completion of said second radio communication and to release the processing to temporarily stop outputting the transmission data in said first radio communication processor, when completion of the radio communication in said second radio communication processor is detected (paragraphs 11-39, 38-53).

3. Claims 4 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over IMATSUKA (JP 2002095051) in view of SEPPANEN (US 6,330,442) and NEVO et al (US 2003/0214961 A1), and in further view of AMRANY et al (US 6,711,207 B1).

Regarding claim 4, the combination of IMATSUKA, SEPPANEN, and NEVO further discloses wherein the step of temporarily stopping output of transmission data further comprises transmitting packets having control data associated with said first bidirectional radio communication even when no data is stored (IMATSUKA - paragraphs 6, 11-39, 62, and 63; call is placed on hold, hence no data is stored and a

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control channel is left open); wherein transmission data is stored in a buffer (SEPPANEN column 14:lines 37-48). However, the combination of IMATSUKA, SEPPANEN, and NEVO does not disclose wherein the packets transmitted when no data is stored in said buffer are transmitted at the lowest transmission rate. AMRANY discloses wherein the packets transmitted when no data is stored in said buffer are transmitted at the lowest transmission rate (abstract). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify the combination of IMATSUKA, SEPPANEN, and NEVO to transmit packets at the lowest rate when no data is being sent as taught by AMRANY since this would allow the preservation of battery power by using lowered transmission power when there is no data present.

Regarding claim 10, see the rejections of the parent claim concerning the subject matter this claim is dependant upon. the combination of IMATSUKA, SEPPANEN, and NEVO further discloses wherein the controller stops the output of transmission data by temporarily inhibiting the input of the transmission data while permitting the transmission of packets having control data associated with said first bidirectional radio communication, even when no data is stored (IMATSUKA - paragraphs 6, 11-39, 62, and 63; call is placed on hold, hence no data is stored and a transmission channel is left open); wherein transmission data is stored in a buffer (SEPPANEN - column 14:lines 37-48). However, the combination of IMATSUKA, SEPPANEN, and NEVO does not disclose wherein the packets transmitted in said state of - having no data are transmitted at the lowest transmission rate. AMRANY discloses wherein the packets

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transmitted in said state of - having no data are transmitted at the lowest transmission rate (abstract). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify the combination of IMATSUKA, SEPPANEN, and NEVO to transmit packets at the lowest rate when no data is being sent as taught by AMRANY since this would allow the preservation of battery power by using lowered transmission power when there is no data present.

4. Claims 6 and 12 rejected under 35 U.S.C. 103(a) as being unpatentable over IMATSUKA (JP 2002095051) in view of SEPPANEN (US 6,330,442) and NEVO et al (US 2003/0214961 A1), further in view of VEGA et al (US 6,282,407 B1).

Regarding claims 6 and 12, see the rejections of the parent claims concerning the subject matter these claims are dependant upon. However the combination of IMATSUKA, SEPPANEN, and NEVO does not disclose wherein the signal transmitted by the reader/writer to start the second radio communication is an electric power wave, and said second radio communication operates under power obtained by receiving electric power wave supplied from said reader/writer. VEGA discloses wherein the signal transmitted by the reader/writer to start the second radio communication is an electric power wave, and said second radio communication operates under power obtained by receiving electric power wave supplied from said reader/writer (column 2:lines 27-40). Therefore it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify IMATSUKA, SEPPANEN, and NEVO to include a passive powering means as taught by VEGA since both systems relate to using a short ranged interrogation/response communication system. This is beneficial

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in that no power is needed to operate the secondary transmission system when in range of the interrogator.

***Conclusion***

5. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ariel Balaoing whose telephone number is (571) 272-7317. The examiner can normally be reached on Monday-Friday from 8:00 AM to 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, William Trost can be reached on (571) 272-7872. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Ariel Balaoing – Art Unit 2617

AB



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